The Pump Handle The Pump Handle

"I had an interview with the Board of Guardians of St. James's parish, on the evening of Thursday, 7th September, and represented the above circumstances to them. In consequence of what I said, the handle of the pump was removed on the following day."

John Snow, 1855

January 2005 Topics

- Influenza Vaccine Update
- Scabies Outbreak
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Influenza Vaccine Update

Adequate supplies of vaccine are now available in North Dakota to vaccinate any person who desires a flu shot. To request vaccine for your facility, contact the North Dakota Department of Health (NDDoH) Immunization Program at 701.328.3386 or toll-free at 800.472.2180.

Public or private providers also can order vaccine directly from the manufacturer, sanofi pasteur (formerly Aventis Pasteur). Information about ordering from sanofi pasteur may be obtained at www.vaccineshoppe.com or 1.800.VACCINE.

As of Feb. 10, 2005, 1,405 cases of influenza had been reported to the NDDoH. Information regarding influenza is available at the North Dakota Department of Health influenza website at www.ndflu.com.



Scabies Outbreak

On Jan. 5, 2005 a facility in North Dakota that provides vocational training to developmentally disabled people reported one confirmed and one suspected case of scabies to the North Dakota Department of Health. The confirmed case was a client in the facility and the suspected case was an employee.

The confirmed case was diagnosed with encrusted scabies and had an onset of rash in November 2004. The case was seen by a primary provider several times but was not

diagnosed with scabies. Scabies was diagnosed in early January by a dermatologist and was confirmed by a skin scraping. The suspected case eventually was diagnosed by a dermatologist, which was confirmed by a skin scraping.

The facility increased surveillance for skin rashes. People reporting a skin rash were instructed to see a health-care provider to "rule out" scabies. Close contacts of both cases were treated preventively. Since treatment of the cases and contacts, no other cases have been reported.

Scabies is caused by skin infestation by the microscopic mite *Sarcoptes scabei*. Scabies is spread by prolonged skin-to-skin contact with a person already infested with scabies or by sharing clothing, towels and bedding. A more severe form of scabies, crusted scabies, may affect people with weakened immune systems or the elderly. Several topical lotions are available to treat scabies and kill the mites within 24 to 48 hours, although itching may persist for as long as one month. Regular housekeeping practices; frequent changing of bedding; laundering linens, towels and clothes with hot water (120°F) for at least 10 minutes and then drying on the hot drier cycle; and stringent personal hygiene are efficient in removing the *Sarcoptes* mites and help prevent further spread of infestation.

For more information about scabies, visit www.cdc.gov/ncidod/dpd/parasites/scabies/factsht_scabies.htm.



Brucellosis Testing

In the past few months the NDDoH has received three reports of ELISA antibody positive tests for brucellosis. According to the U.S. Centers for Disease Control and Prevention (CDC), ELISA tests for brucellosis are sensitive but their specificity is unknown. Cross-reactivity caused by other gram-negative organisms may occur, resulting in difficulty in interpreting the results. The CDC is planning to conduct additional evaluations of the use of ELISA tests for brucellosis.

Case definitions for brucellosis published by the CDC in conjunction with the Council of State and Territorial Epidemiologists are provided below:

Laboratory criteria for diagnosis

- Isolation of Brucella species (spp.) from a clinical specimen, or
- Fourfold or greater rise in *Brucella* spp. agglutination titer between acute- and convalescent-phase serum specimens obtained greater than or equal to two weeks apart and studied at the same laboratory, or
- Demonstration by immunofluorescence of *Brucella* spp. in a clinical specimen

Case classification

- **Probable:** a clinically compatible case that is epidemiologically linked to a confirmed case or that has supportive serology (i.e., *Brucella* spp. agglutination titer of greater than or equal to 160 in one or more serum specimens obtained after onset of symptoms)
- Confirmed: a clinically compatible case that is laboratory confirmed

The NDDoH is requesting consultation with providers prior to testing if brucellosis is suspected. The Division of Microbiology of the NDDoH provides agglutination and culture testing for brucellosis and can request additional testing assistance from the CDC. Additional information about brucellosis is at www.cdc.gov/ncidod/diseases/submenus/sub-brucellosis.htm.



A Rare Type of Chlamydia Identified in the U.S.

In 2003 and 2004, a rare type of chlamydia, denoted as lymphogranuloma venereum (LGV), was identified in clusters of patients in the Netherlands, various European cities and Spain, predominately among men who have sex with men (MSM). In 2005, six cases of LGV have been identified in New York, Atlanta and San Francisco. Cases presented with anorectal syndrome primarily among MSM, most of whom were also HIV positive.

The emergence of LGV is of public health concern because the disease is rare in the United States and other industrialized countries. The United States and other European countries have recently initiated enhanced surveillance programs to detect LGV in high-risk populations, including bisexuals and MSM.

In North Dakota, genital infections caused by *Chlamydia trachomatis* is most often caused by serovars D and E. LGV is a systemic, atypical presentation of *Chlamydia trachomatis* serovars L1, L2 and L3. Symptoms of rectal LGV include mucous or purulent anal discharge, rectal bleeding, constipation, inguinal/femoral lymphadenopathy (buboes), genital or rectal ulcers, and anal and rectal spasms. LGV diagnosis is assisted by serological testing or by antigen detection or isolation and by exclusion of other causes of inguinal lymphadenopathy or genital ulcers. Diagnosis sometimes may be difficult because the clinical and histological presentation of LGV protocolitis can be similar to early signs of inflammatory bowel disease. The recommended treatment of LGV is 100 mg doxycycline, orally, twice a day for 21 days. Treatment cures infection and prevents ongoing tissue damage, although tissue reaction can result in scarring.

Suspected cases of LGV should be reported to the NDDoH by calling 800.472.2180. The Sexually Transmitted Disease Program also will provide assistance for laboratory testing for LGV.

For more information about LGV and treatment recommendations for symptomatic patients and sex partner contacts, see the Oct. 29, 2004, MMWR at www.cdc.gov/mmwr/preview/mmwrhtml/mm5342a2.htm.

Contributing authors of The Pump Handle include Julie Goplin, Tracy Miller, Kirby Kruger and Larry Shireley. For questions, suggestions or inquiries, or to be removed from the mailing list, please contact Julie Goplin of the Division of Disease Control at 701.238.2375 or by email at jgoplin@state.nd.us.

The pump handle picture in the title was obtained from the website www.ph.ucla.edu/epi/snow.html.



Terry Dwelle, MD, MPHTM, State Health Officer Craig Lambrecht, MD, MPH, Chief, Medical Services Section Larry A. Shireley, MS, MPH, Director, Division of Disease Control